GEOGRAPHIC NEWS BULLETINS

Published Weekly by

THE NATIONAL GEOGRAPHIC SOCIETY

(The National Geographic Society is a scientific and educational Society, wholly altruistic, incorporated under the Federal law as a non-commercial institution for the increase of geographic knowledge and its popular diffusion. General Headquarters, Washington, D. C.)

Contents for Week of December 20, 1937. Vol. XVI. No. 24.

1. The Ghost Walks in Talks of German Colonies
2. Rare Los Angeles Landslide Like Common Swiss Avalanches
3. Christmas Candy Gives New Sweets to Old Sweet Tooth
4. Albania at the Age of Twenty-Five
5. Paris Zoo Rich in Specimens and Historic Incidents

NOTE TO TEACHERS—Because of the Christmas and the New Year's holidays, the GEOGRAPHIC NEWS BULLETINS will not be published during the next week. The BULLETINS will be resumed Monday, January 3, 1938.

Photograph by Willard Price

AN EX-GERMAN COLONIST GOES SHOPPING WITH A "PENNY" ON HIS SHOULDER

"Tol" is a native of Yap, one of Germany's former colonies in the Pacific which were mandated to Japan after the World War. The mangrove-wood comb in his coiffure hints at the style of the rest of his costume, which consists of a coral necklace and a crimson loincloth. The pierced stone is the sign of a wealthy man, for it is Yap's coinage, purchasing power varying with size (Bulletin No. 1).

HOW TEACHERS MAY OBTAIN THE BULLETINS

The Geographic News Bulletins are published weekly throughout the school year (thirty issues) and will be mailed to teachers in the United States and its possessions for one year upon receipt of 25 cents (in stamps or money order); in Canada, 50 cents. Entered as second-class matter, January 27, 1922, at the Post Office at Washington, D. C., under the Act of March 3, 1879. Acceptance for mailing at special rate of postage provided for in section 1103, Act of October 3, 1917, authorized February 9, 1922.

UMI

GEOGRAPHIC NEWS BULLETIN

Published Weekly by

THE NATIONAL GEOGRAPHIC SOCIETY

(Founded in 1888 for the Increase and Diffusion of Geographic Knowledge)

General Headquarters, Washington, D. C.

The Ghost Walks in Talks of German Colonies

FOREMOST subject of European diplomats' conversations is the "colonial question." They are haunted by the ghost of Germany's colonial empire, World War casualty-in-chief.

Former German colonies are now held or mandated to Belgium, Japan, France, Portugal, Great Britain, and some of the latter's Dominions, so that the "colonial question" can be boiled down to "Who shall give up what?" to satisfy the Reich. Present holders fear that Germany's demand for colonies is one of the most dangerous threats to world peace.

To five nations were distributed, at the end of the World War, a million square miles of German territories outside of Europe. This foreign empire had been built almost entirely since 1884, when Germany adopted the three-centuries-old expand-abroad policy of Portugal, Spain, England, France, The Netherlands, and Belgium.

Where Are They Now?

A roll call of pre-War colonies reveals the following foreign members of the German empire family:

In Africa

Togoland
Kamerun
German South-West Africa
German East Africa

In China

Kiaochow (Kiauchau) District in Shantung Province, containing Tsingtao
Miscellaneous "concessions"

In the Pacific

German New Guinea
German Samoa
Marshall Islands
Marianas Islands
Solomon Islands
Caroline Islands

Most of these had an imperial governor apiece, except Kiaochow (Kiauchau) in China, which, on a 99-year lease, was administered by a naval officer. White settlers in these territories were outnumbered 500 to 1 by natives. There were no New World colonies to lose, although settlements of German immigrants existed in Brazil, Chile, and Colombia.

Now Germany is shorn of every colonial possession, and is smaller also by 25,000 square miles of territory pared off the sides of the European homeland. The colonies' former names have vanished from the map in some cases, as areas were mandated or ceded to other nations.

The largest lump, German East Africa, was divided unevenly among England, Belgium, and Portugal, who already held territories next door. A postage-stamp portion in the northwest corner went to the Belgians, adding the rich little highland section of Ruanda-Urundi to the Belgian Congo. A southern triangle was tacked on to Portugal's Mozambique. The rest is now Britain's Tanganyika Territory, with 500 miles of coastline, acre after acre of rich coffee and cotton land, square miles by the thousand forested with camphor, ebony or pencil cedar, and mines of diamonds, tin, and gold. Tanganyika fills a former gap in the long-cherished dream of British control from Cape-to-Cairo.

Diamonds Exported by Thousands of Carats

Next largest German patch on Africa's coat of many political colors was German South-West Africa, on the west coast of the continent's base between the British Dominion of the South African Union and the Portuguese colony of Angola. This was mandated to the Union of South Africa, moving 300,000 square miles more under the British flag. Hottentots, Bushmen, and Bantus are among the natives which outnumber white residents ten to one. In this dry country stock raising is general, with some mining of such valuable minerals as tin and vanadium for export. Chief export commodity, however, is the diamond, shipped out to dazzle the world at the rate of a quarter of a million carats in one year (1934).

Divided also was the Kamerun, jungle colony spreading fanwise inland from where Central Africa's overhanging west coast turns southward at right angles. This territory of nearly 200,000 square miles was occupied by less than 2,000 Germans, but the homeland hoped to develop it as a hothouse for such tropical products as vanilla, ginger, pepper, and cloves. Rubber and cocoa were already being sent from there to Germany.

Now the area lives a double life under the name of the Cameroons, a sixth of it in a borderline strip being mandated to adjacent Nigeria under British administration, the rest going

UMI

Photograph by John W. Vandercook

EUROPEAN FLAGS MAY CHANGE, BUT UNDER THEM A CAMEROONS RULER MAINTAINS HIS BARBARIC POMP

At Foumban, near the boundary which divides the British from the French mandate in the Cameroons, the overlord, Njoya, is shown ruling in native style, although French masters have replaced the Germans. His throne is "protected" by images of chieftains behind him, and miniature guards with guns at his feet. The grotesque carving and shell and bead work are typical of the native art collected in "Sultan" Njoya's palace (Bulletin No. 1).

GEOGRAPHIC NEWS BULLETIN

Published Weekly by

THE NATIONAL GEOGRAPHIC SOCIETY

(Founded in 1888 for the Increase and Diffusion of Geographic Knowledge)

General Headquarters, Washington, D. C.

Rare Los Angeles Landslide Like Common Swiss Avalanches

WHEN a mountain steps out and skids destructively into Los Angeles, it's news. But when a comparable landslide starts avalanching down the Alps, it's only the annual bad news which Switzerland expects.

California's landslide is a hint of what devastation may lurk in the shadow of towering mountain heights. The Los Angeles "moving mountain" is a 350-foot bluff in Elysian Park, along the base of which winds Riverside Drive and beyond that the Los Angeles River bed. Geologists estimate that several million tons of rock and earth dropped from the bluff's face and crashed upon the road and bridge at its base.

Checking Avalanches with Frail Alder Bushes

Avalanches on a more gigantic scale are an annual menace in Switzerland. Steep slopes of the Swiss Alps are scarred with ravines down which torrents of snow, earth, and rock roar their death-dealing way several times each season. They rank with earthquakes, volcanic eruptions, floods, and tidal waves as the most powerful destructive forces of nature.

Against their devastating might, the Swiss are now enlisting the protective aid of the frail alder bush. Planting colonies of fast-growing alders on treeless upper slopes of the Alps, they hope that each bush will anchor all the earth and snow within its reach and check the mountainsides' readiness to slide down.

In their descent, Swiss avalanches often engulf villages, smashing houses like matchboxes and burying people and cattle. Telephone lines, hydroelectric plants, and railroad tracks are damaged, and highways are blocked. When rivers, too, are blocked, flood dangers arise.

As if to atone for their destructiveness, avalanches sweep rich soil into valleys, and deposit timber for fuel. They also permit earlier use of the upper fields by freeing them from snow. The slow melting snow that piles up in the valleys provides a perennial water source.

Ever since men built their first chalets on white-topped mountains, they have dreaded avalanches. It is fear of them, rather than depth of snow, that isolates Alpine villages for months at a time. Crosses dotting the Rhone valley show where winter travelers met disaster walking along steep slopes or through narrow valleys.

Travel Faster Than Express Train

Avalanches are most frequent in spring, when rains and thaws loosen the hold of snow on the mountain sides, but they also occur in winter during unseasonal warm spells. What provokes an avalanche? A trifle may start it: an earth tremor, a clap of thunder, vibration from a distant train, a tossed snowball, or even cries or shouts.

Frequently the snow surface appears divided into large, platelike sections. If a group of alpinists or skiers pass single file, cutting a deep line in the crust. there may be a sharp noise like a rifle shot as one of the "plates" breaks away and plunges down the mountain. Most accidents to skiers and alpinists occur at the time of the break.

There are two types of snow avalanches, the dry and the wet. A dry, or "cold" avalanche, is the swifter and more unexpected, and therefore claims more

UMI

to France. Plantations in the British Cameroons supply bananas and rubber, while world trade from the French Cameroons draws palm oil and ivory, almonds and timber.

The narrow strip of Togo was claimed by Germany in 1884, on the ground that it had not been included in either the Gold Coast colony on the west or Dahomey on the east; now it is in both. Two-thirds of it is mandated to the French, proprietors of Dahomey, and the other third is governed by the British governor of the Gold Coast. The white population has stayed near its pre-War figure, about 350. Cotton, copra, cocoa, palm kernels, and tapioca are the chief products.

Germany's largest stake in the Pacific was Kaiser Wilhelm's Land, on the eastern half of the island of New Guinea, and the adjacent spray of islands known as the Bismarck Archipelago. Those proud German names refer to what is now governed from Australia, with such titles as New Britain, New Ireland, and Duke of York Islands. Chinese and native laborers work plantations for copra, coffee, cocoa, and kapok, but some areas have never been explored nor officially gathered under the government's wing.

Under the same mandate administration are two sizable Solomon Islands, Bougainville and Buka, and a whole flotilla of little ones. In the division of German possessions which peppered the Pacific before the War, the islands south of the Equator fell under British influence, those north of the Equator to Japan. The Samoan Islands, formerly shared by Germany and the United States, are now governed by the latter nation and New Zealand, to which were mandated the two largest, Savaii and Upolu, and a few others.

Pacific islands stretching from Nauru (a lonely British Mandate) northwest to the Philippines are under Japanese mandate. The Marianne, Marshall, and Caroline groups contain respectively about one dozen, two dozen, and 500 islets. Contained within their watery domain, but under entirely different management, is Guam, acquired from Spain by the United States.

Along with her realms of influence in the Chinese province of Shantung, which were turned over to the Japanese, Germany lost her special "concessions" in Chinese cities.

Note: Background material about some of Germany's pre-War colonies can be found in the following: "North About," *National Geographic Magazine*, February, 1937 (Pacific Islands); "Mysterious Micronesia," April, 1936; "Coastal Cities of China," November, 1934 (Kiaochow and Tsingtao); "Coconuts & Coral Islands," March, 1934 (Solomon Islands); "Three-Wheeling Through Africa," January, 1934 (Tanganyika); "Flights from Arctic to Equator," April, 1932 (Tanganyika); "Keeping House for the 'Shepherds of the Sun,'" April, 1930 (German South-West Africa); "Into Primeval Papua by Seaplane," September, 1929 (New Guinea); "The Geography of China," June, 1927 (Tsingtao); "Pictorial Jaunt Through Papua" (duotone insert), January, 1927 (New Guinea); "Cairo to Cape Town, Overland," February, 1925; "The Islands of the Pacific," "Yap and Other Pacific Islands under Japanese Mandate," and "Nauru, the Richest Island in the South Seas," December, 1921.

Bulletin No. 1, December 20, 1937.

Photograph by Frank J. Magee, R.N.V.R.

WHERE THE BRITISH FLEET WENT TO WAR BY JUNGLE PATH AND TRAIN

One of the strangest chapters in the history of Germany's former colonies is that dealing with naval engagements of the World War in Africa, far inland on Lake Tanganyika. Boats mounted in wooden cradles on wheels were tugged overland through dense jungle by oxen, perspiring natives and finally by a little traction engine. The picture shows the British boat with a French name *Mimi* being launched into the African lake to assist a Belgian fleet in an attack on the German colonial flotilla.

GEOGRAPHIC NEWS BULLETIN

Published Weekly by

THE NATIONAL GEOGRAPHIC SOCIETY

(Founded in 1888 for the Increase and Diffusion of Geographic Knowledge)

General Headquarters, Washington, D. C.

Christmas Candy Gives New Sweets to Old Sweet Tooth

"VISIONS of sugar-plums" still accompany Christmas. Today's version of the hard, round, plumless mouthful of candy which mid-Victorians called "sugar-plum" may be any of countless kinds of confection. For mankind's sweetmeat savoring has brought together ingredients and recipes from all over the world.

Sixteen pounds per person was the candy consumption of the United States last year. This whopping national appetite was appeased by one of the country's major food industries. It is safe to say that American sweets for Christmas, 1837, were mostly made in the kitchen between meals with Mother's help. This year's candy boxes were filled mainly in large factories, where almost half of the year's candies are cooked up in the year's last four months. The Christmas sweet tooth usually creates a demand 140 per cent above normal.

Marzipan Shaped Like Peaches and Pigs

The four "sweetest" States are Illinois, New York, Pennsylvania, and Massachusetts. They fill almost three-fourths of America's candy-hungry mouths.

Christmas is one time when the candy bar, that 20th century sweets star which in about thirty years has come to represent 30 per cent of all American candy sales, is eclipsed by older and more exotic forms of sweetmeats. Imported recipes keep American factories busy with nougat and marzipan. Imported confections make American candy counters break out in a bright rash of foil-wrapped chocolate santas from Central Europe, tin boxes of toffee from England, miniature pink pigs from Germany, candied violets and rose petals from France.

Outstanding sweet of European Christmases is marzipan, luscious with the almond richness of its Oriental origin. It is the fairy godmother of confectioners' magic, for from almonds pounded to a paste, sweetened with sugar and fluffed with egg white, it produces candy statuettes, animals, vegetables, and inviting miniature dishes of food. Pat marzipan into an oval, rouge its cheek, top it with an artificial stem and leaf, and you have a pear. Apples, strawberries, bananas, and peaches are other fruits which the almond bears by marzipan magic.

Rounded into miniature loaves it is sold in Norway as marzipan "bröd," and American candy makers package it as a confectioner's dozen of tiny coconut-flecked French pastries. It masquerades as a slice of bread bearing a strip of bacon or a pair of fried eggs or a sliver of Swiss cheese. Favorite figure in the marzipan menagerie is the little pink pig with a money bag on his back.

Candy Made As Medicine

Much of marzipan's prominence developed along with the German practice of tying confectionery on the Christmas tree to be "plundered" by visitors from the whole neighborhood. As the tree became popular through Europe less than a century ago, to be adopted in England with Queen Victoria's German husband and in America with German immigrants, it bore its annual holiday crop of candy and gingerbread (*Lebkuchen*) in the shape of hearts, pretzels, and stars.

Hard candies are associated with England, where tons of sweets with satiny gloss are made durable enough to survive shipping to distant colonies. One-half of the candy imported to the United States comes from Great Britain, much of it being chewy cubes of buttery toffee twisted into bright paper wrappings. Complicated machinery, air-conditioned factories, and chemical laboratories contribute to American manufacture of hard candies, but the chief ingredients are still sugar

UMI

victims. It is dry powdery snow, and it shoots down a slope faster than an express train, at times more than 120 miles an hour. It pushes ahead of it a violent blast of wind that possesses great destructive force. If a break occurs in a ravine down which the snow flows, it cascades like a waterfall, sending up billowing clouds of snow "dust."

May Take Years To Melt

Slower and consequently less dangerous to life, the wet or "warm" avalanche nevertheless causes more property damage. Loosened by spring rains or by thaws in winter, this heavy, lumpy, watersoaked mass of slush descends. Usually it travels no faster than twelve miles an hour, but it carries along with it earth, boulders, and uprooted trees, blocking roads and railroads, and tearing down telegraph and power lines.

Both dry and wet avalanches look alike in the end. If stopped before they leave their ravines, they remain tongue-shaped. If they sweep out of the ravines, they spread out fanwise and sometimes take several years to melt.

Note: For references to and pictures of areas in which landslides have occurred, see "Lake Geneva: Cradle of Conferences," *National Geographic Magazine*, December, 1937; "August First in Gruyères," August, 1936; "New Zealand 'Down Under,'" February, 1936; "Southern California at Work," November, 1934; "Manless Alpine Climbing," August, 1934; "Western National Parks Invite America Out of Doors," (duotone insert) July, 1934; "Skiing in Switzerland's Realm of Winter Sports," March, 1933; "Flights from Arctic to Equator," April, 1932; "Where the Mountains Walked," May, 1922; "Our Greatest National Monument," (Valley of Ten Thousand Smokes) September, 1931; and "Landslides and Rock Avalanches," April, 1910.

Bulletin No. 2, December 20, 1937.

Photograph by the Hayes-Hall Kansu Earthquake Relief Expedition

WHEN THE MOUNTAINS WALKED, THE ROAD WENT, TOO

Landslides of gigantic proportions were set in motion by one of the most spectacular earthquake catastrophes in modern history, which devastated western Kansu Province, in China, during December, 1920. Since most of the area was about a mile above sea level, and covered with wind-blown hills of powdery loess soil, landslides rushed across the landscape like watery floods. This poplar-bordered highway had been "going" across country for years by merely standing still, but a landslide picked up a quarter-mile section of it and made it "travel" a whole mile in another direction.

GEOGRAPHIC NEWS BULLETIN

Published Weekly by

THE NATIONAL GEOGRAPHIC SOCIETY

(Founded in 1888 for the Increase and Diffusion of Geographic Knowledge)

General Headquarters, Washington, D. C.

Albania at the Age of Twenty-five

"YOUNG America" is a favorite phrase of those who like to contrast the United States with European nations. "Young Europe is more appropriate," Albania seems to be reminding the world. One of the several small new nations of 20th century Europe, youthful Albania at the end of last month celebrated the 25th year of its independence.

Since breaking away from Turkey on November 28, 1912, Albania has been ruled as a Principality, a ward of an International Commission of Control, a republic for three years, and since 1928 as a monarchy under King Zog. The Constitution of the "young" United States this year reached the age of a century and a half; the total of Albania's national existence adds up to one-sixth of that period.

Stronghold of Islam Within Sight of Italy

This young Balkan nation, with new Yugoslavia to the north and age-old Greece to the south, is still schooling itself in the ways of the West, discarding Turkey's oriental influence gradually as the Albanian women have been discarding their Turkish veils. The veil, still concealing the faces of older women, although younger ones had already cast it off, was forbidden by law this year. Feminine fashion notes give further evidence of Turkish influence, for some women still wear huge harem-style trousers.

The little Albanian fragment of the old Ottoman Empire, which set out to make a fortune on its own, is somewhat larger than the State of Vermont, with 10,629 square miles. But with 10 per cent more area than the Green Mountain State, it has almost 200 per cent more population. The population of a million is made up mainly of Ghegs in the north and Tosks in the south, the Mason and Dixon Line of Albania's division being the Shkumbini River. The Tosks are distinguished by their dress. In the back country, men wear gold-embroidered jackets and wide sashes over plaited knee-length white skirts almost as full as a ballet dancer's.

As important as tribal differences, however, is the division along religious lines. Two-thirds of the Albanians are Moslems, and muezzins from mosque minarets call them to prayers before the same Allah as that of Africa and Asia.

Many Migrated to the United States

This European stronghold of Mohammed is "within sight of Italy," only fifty miles away across the Adriatic. As part of ancient Illyria, Albania was once a province of the Roman Empire, crossed by Roman *vias* and legions, and visited by summering Roman senators. A still earlier relationship with the glory that was ancient Greece is acknowledged both by Albanians and by their Greek neighbors next door on the south, for Albanians believe that they represent the oldest race of southeastern Europe. Strongest foreign influence is that of Turkey, which dominated Albania from 1479 until 1912.

A modern rival from abroad is the influence of the United States, to which Albanian immigration was heavy until a yearly quota of 100 was imposed. Americanized Albanians, either "would-like-to-be" or "has-been," are numerous in their mother country. Money earned in the United States has built modern homes in Albania, equipped with electricity, steam heat, modern plumbing, and telephones.

Slowly the country is being coaxed from its placid slow-tempo agricultural existence toward the machine age. Progress is hampered by mountain barriers, for Albania is barricaded with mountain chains, some more than a mile high. Only

UMI

and water, and super-machines go through the same pulling motions of the old-fashioned candy pulls. Christmas dainties are frequently pulled in ten-foot "hanks" by hand, with the protection of buckskin gloves. Coal tar and vegetable colorings stripe the candy cane, or give the sugary cylinder a tiny gemlike colored core.

Color comes to chocolate in the form of bright tinfoil, delicately thin, and smoothed onto hollow chocolate figures. Most foil-wrapped novelties are imported. Vienna sends rows of tiny bottles; Poland, small boats on strings for Christmas tree tying; Switzerland, gold, silver, and red-wrapped chocolate pipes and bells; Estonia, dogs and cats in green and blue foil; Latvia, shiny silver champagne bottles in gold-covered ice buckets; Czechoslovakia, assorted sizes of Santa Clauses with long silver beards. Next to England, in 1935 our leading foreign candy cooks were Latvia and Estonia.

A Mesopotamian medicine man of the 6th century A.D., tradition asserts, was brewing a curative potion from cane-juice when he discovered the first sugar crystals. It was he who gave sweetmeats a sweetening other than the honey called for in Biblical recipes and Egyptian papyri.

The European doctor's efforts, only a few centuries ago, to cloak his bitter doses within a sweet coating are reputed to have founded the modern dynasty of boiled sugar candies. It is a matter of record that sugar, once almost as precious as a teaspoonful of chip diamonds, was a valued medicine before it went into the kitchen. Candy in some form, however, is older than its name, which goes back through Arabic *qandi* and Persian *qand* to the Hindu word for sugar, *khand*, starting its world career where sugar cane started—in India.

Photograph by W. Pfingstl

IN QUIET GERMAN SCENES STARTED MUCH OF TODAY'S CHRISTMAS CLAMOR

Such features of noisy Christmas excitement as the decorated tree, the great variety of holiday confections, and favorite old carols have spread through Europe and America from villages like Oberammergau, visited by 400,000 people in the years of its famous Passion Play. Comparable to the houses shown here are the miniature pasteboard "Advent Houses," one of the unusual Christmas confections imported from Germany. To help eager children count off the days from December 1 until the "Advent" of Christmas, the pasteboard houses have 24 numbered doors and windows, around which are pictured expectant boys and girls, rabbits, birds, and squirrels. Each day the little owner opens the window numbered with the corresponding date, and on December 24 opens the double front doors to a houseful of gingerbread within.

GEOGRAPHIC NEWS BULLETIN

Published Weekly by

THE NATIONAL GEOGRAPHIC SOCIETY

(Founded in 1888 for the Increase and Diffusion of Geographic Knowledge)

General Headquarters, Washington, D. C.

Paris Zoo Rich in Specimens and Historic Incidents

NEW buildings and arrangements are helping the Paris Zoo live up to its name, the Jardin des Plantes. A "garden of plants" occupies the center in its new plan, with animal houses and cages grouped around it. This improvement in the famous zoological and botanical gardens, which spread over 74 acres near the Seine, is one of the many adjustments which have put Paris on parade for the 1937-38 International Exposition.

A large new cement house for ferocious animals is a feature of the new Jardin des Plantes. It will replace the second oldest building in the Zoo, the long, low animal house built in 1818, in whose more than 20 cages lions, tigers, and other beasts have been padding around on warped floors.

Monkeys Have Luxury House

Monkeys are living in luxury in a large new monkey house completed in 1934, which, with its plate glass windows and immaculate white tiled walls, is a model of its kind.

One of the oldest zoological and botanical gardens in Europe, the Jardin des Plantes was founded by Louis XIII and Guy de la Brosse in 1635 as an experimental garden for medicinal plants. An important collection of animals was not added until 1793.

Today the botanical garden, greatly expanded since its founding, has many frequenters. Visitors flock into the greenhouses filled with treelike ferns, flowering coffee trees, and tropical plants from the various French colonies. The Alpine Garden contains rare plants from high altitudes in many countries. Under century-old trees, women sit knitting, with "half an eye" on their offspring riding in gay goat carts and on small gray donkeys. Other mothers push heavy black baby buggies down the long shady walks, stopping to admire bright dahlias in the ornate flowerbeds, or labeled specimens of medicinal and commercial plants.

The Natural History Museum and the Mineral Museum both attract students. But crowds in the greatest numbers wander through the zoological part of the garden. They stroll in family groups past the rustic wood house of the ruminants (cud chewers), past the brilliant macaws screaming on their outdoor perches, and the swans preening themselves on the waters of a brook. Small boys in knitted or black velvet suits stare hypnotized at tigers. Little girls wave tiny white-gloved hands at keepers sweeping out cages with twig brooms.

Visitors Buy Bread for Animals

In spite of the signs *Défense d'exciter les animaux,* men occasionally poke pointed sticks through the bars. Old women in pinwheel-decorated booths do a thriving business in small hard loaves of bread, *Pain pour les animaux,* which visitors toss down to polar bears and brown bears in the pits.

It was probably just such bread that a kindly keeper used to steal from the bears' rations to give to a poor young artist sketching the animals. These exquisite pencil sketches made in the Jardin des Plantes can be seen in the Louvre, for the hungry young man was Antoine Louis Barye, later celebrated as an outstanding animal sculptor. His realistic small bronzes of animals in action are exhibited in art museums in both the Old and the New Worlds.

The Jardin des Plantes has known many exciting times. During the Siege of Paris in 1870-71, when famine was causing as much havoc as the besieging Prussians, many of the zoo animals were butchered for food. Starving Parisians paid

UMI

two rivers are even partially navigable, and these dwindle away to bone-dry stream beds in summer. Horseback travel, still important enough to support big horse fairs, was the only means of penetrating the country's barbaric highland fastnesses until the World War made roads for troop movements a matter of life or death.

In 1933 Albania had over a thousand miles of motor roads, although mountain torrents required over 2,000 bridges.

Under Turkish rule, Albania was kept backward. About its only industry was rug-weaving. Since teaching in the Albanian language was forbidden, education remained stagnant. Today, Albania has 631 state-supported primary schools, 13 secondary schools, and 358 of its citizens studying in foreign universities.

Important among the crops are tobacco, corn, and olives. In former years the olives were all exported, and olive oil had to be imported. Two oil refineries were established in 1930 and the next year olive oil was exported. Cotton, the growing of which was begun during the War, is raised for domestic use. Between 1933 and 1935, orchardists received approximately 200,000 free fruit trees from the Albanian Government.

Most of the country dwellers who are not farming are raising live stock. On the plains roam cattle, sheep, and goats. These furnish wool, hides, and dairy products. Cattle, cheese, and hides are exported.

With all its Adriatic coastline, Albania's fishing industry is largely undeveloped, and many of its citizens eat imported canned fish. Another unrealized asset consists of minerals which are thought to exist in quantities and to include petroleum, coal, iron, bitumen and copper. Bitumen forms one of the chief exports, but, except for this substance and some copper, the minerals are not exploited.

Note: Additional background material about Albania can be found in "Europe's Newest Kingdom," *National Geographic Magazine*, February, 1931; "The Battle-Line of Languages in Western Europe," February, 1923; "The Geography of Our Foreign Trade," January, 1922; "The New Map of Europe," February, 1921; "The Races of Europe," December, 1918.

Bulletin No. 4, December 20, 1937.

Photograph by Merl La Voy

"HOW MUCH COWHIDE MAKES A HORSE SADDLE?"

Hides figure in Albania's small export trade, but most of the rawhide output is home-grown, home-tanned by a primitive process using acorns, for home use on home-grown horses' harness. Strips of rawhide are here displayed in an outdoor market, spread on the ground with no showcase except a few sunny stones.

as much as five dollars a pound for lion, bear, giraffe, and even hippopotamus meat. The shots that felled the animals were only slight disturbances in the garden where enemy shells were constantly shattering the glass of the greenhouses.

The Jardin des Plantes has no giraffe at present, but in 1827 it exhibited the first living one ever seen in France. A present from the Pasha of Egypt, the creature arrived in Marseille wearing as an amulet a parchment inscribed with a passage from the Koran. It was accompanied by four Arab keepers, and three cows to furnish it with milk. Traveling on foot from Marseille to Paris, it created a stir all along the way. When it arrived in the capital, everyone flocked to the zoo to see it, Parisians went wild about it, dedicated songs and articles to it, and designed hats and dresses after it.

The only previous excitement at the zoo that could compare with the giraffe's reception was the sensation caused in 1795 by the arrival of two elephants from near Apeldoorn, Holland. They had traveled by land and on ships in specially built wooden cages mounted on wheels, but since the wagons sometimes broke down, it took them two years to make the approximately 300-mile journey. Not long after they arrived, sixteen Conservatory artists solemnly played different kinds of music for the elephants, whose reactions were studied by scientists.

Note: Additional material about the Paris Zoo can be found in "Paris in Spring," in the *National Geographic Magazine* for October, 1936.

See also in the GEOGRAPHIC NEWS BULLETINS: "Modern Noah's Ark Returns with Rare Animals for Uncle Sam's Zoo," week of October 18, 1937.

Bulletin No. 5, December 20, 1937.

Photograph by Maynard Owen Williams

LITTLE PARISIANS START YOUNG AS AMATEUR ZOO KEEPERS

There are no "Do Not Feed the Animals" signs here, in Paris's special zoo section for *les petits*—little creatures and little observers. Lambs and kids clamor for bread and milk fed to them by small visitors, and tiny hands can pat and smooth without fear the rabbits and guinea pigs. These animals never suffer from a lack of "keepers," and sometimes they have more eager little feeders than room for food.